

# Studies on Adulteration and Misusage of Wolfberry Rootbark in Market

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## ABSTRACT

Methods of anatomy and morphology were used to identify the authenticity of commercial wolfberry rootbark in Taiwan, whose botanical origin is dried rootbark of *Lycium chinense* Mill. and *Lycium barbarum* L. (Solanaceae). Wolfberry rootbark was recorded as superior category of Traditional Chinese Medicine (TCM) in *Shennong Bencaojing (Classic of Herbal Medicine)* at the earliest. It is classified as heat-clearing formula used for draining fire, and cooling blood of human body.

According to current reports, there are adulterants of wolfberry rootbark appearing in China gradually. In order to assure the safety of consumers and the quality of TCM in Taiwan, forty-six commercial samples were collected and tested.

The results showed that 31 out of 46 samples (67%) were *Lycium chinense* Mill., and the origin of the other 15 samples (33%) were unknown which are not only chaos, but also with misused xylem part of wolfberry rootbark. Based on the results, it is necessary to enhance the regulation in order to improve the quality of commercial wolfberry rootbark.

Key words: wolfberry rootbark, *Lycium chinense* Mill., *Lycium barbarum* L., identified